| Notice of Allowability   | Application No.   | Applicant(s)                 |
|--|---|------------------------------|
|  | 10/032,221  | KALLURI, RAGHURAM            |
|  | Examiner  | Art Unit                     |
|  | Maher M. Haddad   | 1644                         |
|  | Warier W. Haddad  | 1044                         |
| The MAILING DATE of this communication appears on the cover sheet with the correspondence address All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS. This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308. |   |                              |
| 1. This communication is responsive to 10/31/07 and 02/1/08.   |   |                              |
| 2. ☑ The allowed claim(s) is/are <u>118-126</u> .  |   |                              |
| 3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  a) ☐ All b) ☐ Some* c) ☐ None of the:  |   |                              |
| 1. Certified copies of the priority documents have been received.  |   |                              |
| 2. Certified copies of the priority documents have been received in Application No   |   |                              |
| 3. Copies of the certified copies of the priority documents have been received in this national stage application from the   |   |                              |
| International Bureau (PCT Rule 17.2(a)).   |   |                              |
| * Certified copies not received:   |   |                              |
| Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.  THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.   |   |                              |
| 4. A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.   |   |                              |
| 5. CORRECTED DRAWINGS ( as "replacement sheets") must be submitted.  |   |                              |
| (a) 🔲 including changes required by the Notice of Draftsperson's Patent Drawing Review ( PTO-948) attached   |   |                              |
| 1) 🗌 hereto or 2) 🔲 to Paper No./Mail Date   |   |                              |
| (b) ⊠ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date   |   |                              |
| Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).  |   |                              |
| 6. DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.  |   |                              |
|  |   |                              |
|  |   |                              |
| Attachment(s)  |   |                              |
| 1. Notice of References Cited (PTO-892)  | 5. Notice of Informal F                                 | , ,                          |
| 2. Notice of Draftperson's Patent Drawing Review (PTO-948)   | <ol> <li>Interview Summary Paper No./Mail Da</li> </ol> |                              |
| 3. Information Disclosure Statements (PTO/SB/08),  | 7. 🛛 Examiner's Amend                                   | ment/Comment                 |
| Paper No./Mail Date: 1/16/08  4. Examiner's Comment Regarding Requirement for Deposit  | 8.  Examiner's Statem                                   | ent of Reasons for Allowance |
| of Biological Material   | 9.  |                              |
|  |   |                              |
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## **DETAILED ACTION**

1. Applicant's amendment, filed 10/31/07 and 2/1/08, is acknowledged.

## **EXAMINER'S AMENDMENT**

- 2. An Examiner's Amendment to the record appears below. Should the changes and/or additions be unacceptable to Applicant, an amendment may be filed as provided by 37 C.F.R. § 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the Issue Fee.
- 3. Authorization for this Examiner's Amendment was given in a telephone interview with Jeffrey A. Lindeman on 1/23/08.

## In the Claims:

- 4. Amend claims 118-126 as follows:
- -- 118. An isolated polypeptide <u>consisting</u> of the amino acid sequence Lys Leu Phe Cys Asn Val Asn Cys Val Cys Asn Phe Ala Ser Arg Asn Asp Tyr <u>Ser (SEQ ID NO:41)</u>, wherein said polypeptide is has the ability to of inhibit angiogenic activity or the ability to inhibit protein synthesis in endothelial cells.
- 119. An isolated polypeptide <u>consisting</u> of the amino acid sequence Thr Met Pro Phe Leu Phe Cys Ash Val Asn Asp Val Cys Ash Phe Ala Ser Arg Asn Asp Tyr Ser Tyr Trp Leu (SEQ ID NO:37), wherein said polypeptide is has the ability to of inhibit angiogenic activity or the ability to inhibit protein synthesis in endothelial cells.
- 120. The An isolated polypeptide of claim 119, in which the first Leu residue has been replaced with Met, the has first Val residue has been replaced with Ile, and the Asp-residue has been replaced with Asn, such that the peptide has consisting of the amino acid sequence Thr Met Pro Phe Met Phe Cys Asn Ile Ash Ash Val Cys Asn Phe Ala Set Arg Ash Asp Tyr Ser Tyr Trp Leu (SEQ ID NO:38).
- 121. An isolated polypeptide <u>consisting</u> of the amino acid sequence Lys Gln Arg Phe Thr Thr Met Pro Phe Leu Phe Cys Asn Val Asn Asp Val Cys Asn Phe Ala Ser Arg Asn Asp Tyr Ser (SEQ ID NO:39), wherein said polypeptide is has the ability to of inhibit angiogenic activity or the ability to inhibit protein synthesis in endothelial cells.

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- 122. <u>An</u> The isolated polypeptide <u>consisting of of claim 121</u>, in which the Cys residues have been replaced with Ser residues such that the polypeptide has the <u>amino acid</u> sequence Lys Gln Arg Phe Thr Thr Met Pro Phe Leu Phe Ser Asn Val Asn Asp Val Ser Asn Phe Ala Set Arg Asn Asp Tyr Set (SEQ ID NO:40).
- 123. An The isolated polypeptide consisting of of claim-121, in which the Cys residues have been replaced with Asp residues such that the polypeptide has the amino acid sequence Lys Gln Arg Phe Thr Tier Met Pro Phe Leu Phe Asp Asn Vat Asn Asp Val Asp Ash Phe Ala Ser Arg Asn Asp Tyr Ser (SEQ ID NO:42).
- 124. The isolated polypeptide of claim 119, wherein said polypeptide is capable of inhibiting tumor growth.
- 125. An isolated, mutated Tumstatin polypeptide of SEQ ID NO: 10 comprising at least one of the following mutations:
  - (a) wherein the Leu at position 77, Val and position 81 and Asp at position 83 have been substitute for Met, Ile and Asn, respectively;
  - (b) wherein the Leu at position 68 has been substituted for Lys;
  - (c) wherein the Leu at position 68, Cys at positions 79 and 85 have been substituted for Lys, Ser and Ser, respectively;
  - (d) wherein Phe at position 76 and Asp at position 83 have been substituted for Lys and Cys, respectively; or
  - (e) wherein Leu at position 68 and Cys at positions 79 and 85 have been substituted for Lys, Asp and Asp, respectively; and

wherein said mutated polypeptide has the ability to inhibit angiogenic activity or the ability to inhibit protein synthesis in endothelial cells.

- 126. An isolated, <u>mutated</u> Tumstatin polypeptide of SEQ ID NO: 10 having the amino acid sequence of SEQ ID NOs:37-42, wherein said mutated polypeptide has the ability to inhibit angiogenic activity or the ability to inhibit protein synthesis in endothelial cells. --
- 5. Claims 118-126 are allowable.
- 6. Formal drawings have been submitted which fail to comply with 37 CFR 1.84. Substituted FIG. 42, filed on 2/01/08, indicated two T3 peptides. Further, new Fig. 42 is missing peptide T2. Finally, new figure 42 does not have the correct delineation of each peptide. For example, T3 peptide should start at amino acids 68-87, however Fig. 42 indicates that T3 starts at 46-65. Correction is required.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Maher Haddad whose telephone number is (571) 272-0845. The examiner can normally be reached Monday through Friday from 7:30 am to 4:00 pm. A message may be left on the examiner's voice mail service. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Eileen B. O'Hara can be reached on (571) 272-0878. The fax number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

February 4, 2008

Maker Haddad

Maher Haddad, Ph.D. Primary Examiner Technology Center 1600